

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

	APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	1
	10/085,585	03/01/2002	Takuma Saito	H07-137800M/NHK	8975	•
21254 7590 06/09/2005		590 06/09/2005		EXAMINER		
	MCGINN & GIBB, PLLC 8321 OLD COURTHOUSE ROAD			LOPEZ, MICHELLE		
	SUITE 200			ART UNIT	PAPER NUMBER	I
	VIENNA, VA	22182-3817		. 3721		

DATE MAILED: 06/09/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)				
	10/085,585	SAITO ET AL.				
Office Action Summary	Examiner	Art Unit				
	Michelle Lopez	3721				
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply						
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication. - If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely. - If NO period for reply sepecified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication. - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).						
Status						
1) Responsive to communication(s) filed on 28 February 2005.						
2a) ☐ This action is FINAL. 2b) ☑ This	<u>_</u>					
3) Since this application is in condition for allowance except for formal matters, prosecution as to the ments is						
closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.						
Disposition of Claims						
4) ☐ Claim(s) 1-13,15 and 17-37 is/are pending in the application. 4a) Of the above claim(s) is/are withdrawn from consideration. 5) ☐ Claim(s) is/are allowed. 6) ☐ Claim(s) 1-13,15,17-37 is/are rejected. 7) ☐ Claim(s) is/are objected to. 8) ☐ Claim(s) are subject to restriction and/or election requirement.						
Application Papers						
9)☐ The specification is objected to by the Examiner.						
10) ☐ The drawing(s) filed on is/are: a) ☐ acc	10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.					
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).						
11)☐ The oath or declaration is objected to by the Ex	taminer. Note the attached Office	Action of form P1O-152.				
Priority under 35 U.S.C. § 119						
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No. 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received.						
Attachment(s)						
1) Notice of References Cited (PTO-892)	4) 🔲 Interview Summary Paper No(s)/Mail Da					
 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date 		atent Application (PTO-152)				

Art Unit: 3721

DETAILED ACTION

- 1. This action is in response to the amendment field on February 28, 2005.
- 2. Claims 14 and 16 have been canceled.
- 3. New claims 34-37 have been added.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 1-13, 15, 17-33 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claims 1, 13, 20, 28-30, it is not clear what is meant by "only slightly rotatable relative to the housing". The term "only slightly" has little meaning since no structure is set forth and it is merely a relative term without a point of reference regarding the scope or difficulty of rotation.

Furthermore, is the gear fixed to the housing?

In claim 21, it is not clear how the striking mechanism converts the power of said speed reduction mechanism in a rotational impact force?

In claim 29, lines 14, 15, and 17, it is not clear which of the "gears" is hold by the support member, which of the "gears" has a projection, and which of the "gears" is arranged relative to the housing.

In claim 30 it is not clear which of the gears is being claimed.

Also, in claim 30, the limitation "as to rotate only very slightly" renders the claim indefinite since it is not clear how is the rotation of the gear.

Art Unit: 3721

In claim 31 it is not clear which of the gears is being claimed.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 1-4, 8-9, 11, 13, 15, 17-23, 28, 34-37 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kawasaki et al. (5,601,149) in view of Taylor et al (6,098,726).

Kawasaki discloses a power tool for imparting a rotational impact force to an end tool comprising a housing; a powered drive source M; a speed reduction mechanism portion 21 with a gear arranged relative to the housing and transmitting a rotational power of said powered drive source; and a striking mechanism portion for converting the rotational power of said speed reduction mechanism into a striking force, a fixed gear support jig and a gear (not shown numerically.

With respect to claims 1, 13, 20 Kawasaki does not disclose an impact damping mechanism for damping an impact on said speed reduction mechanism portion in a direction of rotation of said gear, wherein the speed reduction mechanism and the gear arrangement are deemed to be a rotary transmitting mechanism that transmits a rotational power from a drive source to and end tool.

However, Taylor teaches a rotary transmitting mechanism via 20,24 that transmit a rotational power from a drive source to an end tool having an impact damping mechanism portion for damping an impact in a direction of rotation of the rotary transmitting mechanism as

Application/Control Number: 10/085,585

Art Unit: 3721

shown in Fig. 2, for the purpose of reducing damage of the rotary transmitting mechanism. In view of Taylor, it would have been obvious to one having ordinary skill in the art to have provided Kawasaki's invention with an impact damping mechanism portion for damping an impact in a direction of rotation of a rotary transmitting mechanism in order to reduce damage of the rotary transmitting mechanism.

With respect to claims 2-4, 9, 11, 18-19, 22-23, Taylor also teaches a projection 38 and an impact damping member 44 (claims 2, 18, 22); a fixed gear support jig via 24 mounted in a housing having a projection 40 (claims 3, 19, 23) formed on a side surface of said support jig (claim 9), wherein the projection 38 is formed on a side surface of 20 (claim 4).

With respect to claim 8, Kawasaki discloses wherein the drive source comprises a motor.

With respect to claim 15, Kawasaki discloses wherein said striking mechanism converts the rotational power of said speed reduction mechanism into said striking portion.

With respect to claim 17, Kawasaki discloses an end tool 16.

As far as claim 21 was understood, Kawasaki discloses wherein the striking mechanism converts power of the speed reduction into a striking force via 3.

With respect to claims 28, Kawasaki discloses the invention substantially as claimed including a drive source M; a housing; a speed reducer 21 having a fixed gear support jig and a gear (not shown numerically), wherein the gear transmit a rotational movement from said drive source; and a striking mechanism via 3, but does not disclose an impact damping mechanism that dampens a rotational impact between said gear and said housing.

However, Taylor teaches a rotary transmitting mechanism via 20,24 that transmit a rotational power from a drive source to an end tool having an impact damping mechanism

Application/Control Number: 10/085,585 Page 5

Art Unit: 3721

portion for damping a rotational impact between a rotary transmitting mechanism 20 and a housing as shown in Fig. 2, for the purpose of reducing damage of both. In view of Taylor, it would have been obvious to one having ordinary skill in the art to have provided Kawasaki's invention with an impact damping mechanism portion for damping a rotational impact between a rotary transmitting mechanism, i.e. a gear, and a housing in order to reduce damage of both.

With respect to claims 34-37, Taylor also teaches a projection 40 on a fixed support jig 24 (claim 34), wherein said projection is on a side surface of said support jig (claim 35); an impact damping member 44 adjacent to said projection and said support jig (claims 36-37).

Allowable Subject Matter

- 4. Claims 5-7, 10, 12, 24-27 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.
- 5. Claims 29-33 would be allowable if rewritten to overcome the rejection(s) under 35U.S.C. 112, 2nd paragraph, set forth in this Office action.

Response to Arguments

6. Applicant's arguments have been fully considered and are persuasive. Therefore, the rejection has been withdrawn. However, upon further consideration, a new ground(s) of rejection is made over Kawasaki et al. (5,601,149) in view of Taylor et al (6,098,726).

Conclusion

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Michelle Lopez whose telephone number is 571-272-4464. The examiner can normally be reached on Monday - Thursday: 8:00 am - 6:00 pm.

Art Unit: 3721

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Rinaldi Rada can be reached on 571-272-4467. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

8. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

ML

JOHN SIPOS PRIMARY EXAMINER